the
GLOXINIAN
The Journal for Gesneriad Growers
Vol. 48, No. 2 Second Quarter 1998

Chirita fimbrisepala

American Gloxinia and Gesneriad Society, Inc.

A non-profit membership corporation chartered by the State of Missouri

For Your Information

Membership Cards: The address label on the back cover of THE GLOXINIAN is your membership card.

Changes of Address: Send changes of address to the Membership Secretary. Please notify us 90 days prior to moving to avoid missing an issue. THE GLOXINIAN is not responsible for replacing issues missed because of late notification of address changes. See back cover to order back issues.

Renewals: Send dues to the Membership Secretariat. A Renewal Notice is sent to you two months prior to the expiration date of your membership. (The expiration date is printed on the mailing label/membership card on the back cover of THE GLOXINIAN.) Please remit your dues prior to the expiration date to avoid missing an issue. THE GLOXINIAN is not responsible for replacing issues missed because of late payment of dues. See back cover to order back issues.

Bylaws: Copies of AGGS Bylaws are available to all members by writing to Isla Montgomery, 216 Ross, Downs, KS 67437.

Chapters: Report changes of chapter presidents to the Editor of THE GLOXINIAN.

AGGS Home Page: <http://www.aggs.org>.

THE GLOXINIAN is published quarterly by the American Gloxinia and Gesneriad Society, Inc., 399 River Road, Hudson, MA 01749-2627.

Postage paid at Providence, RI. Postmaster: Please send Form 3579 to THE GLOXINIAN, AGGS Membership Secretariat, MJ & DB Tyler, P.O. Box 1598, Port Angeles, WA 98362-0194.

American Gloxinia and Gesneriad Society, Inc.

EDITOR
Jeanne Katzenstein
1 Hallvard Terrace
Rockaway, NJ 07866
Email <editor@aggs.org>

EDITOR'S DEADLINES
First Quarter ..... October 10
Second Quarter ..... January 10
Third Quarter ..... April 10
Fourth Quarter ..... July 10

EDITORIAL STAFF AND CONTRIBUTING EDITORS
Frances Batcheller, Judy Becker, Arleen Dewell, Maryjane Evans, Martin Kunhardt, Darrell Trout, David Turley

BUSINESS MANAGER
Michael A. Riley <riley2362@aol.com>
101 West 104th Street
New York, NY 10025

ADVERTISING MANAGER
Dale Martens <martens@wt.net>
2728 Masters Drive
League City, TX 77573-4403

MEMBERSHIP AND SUBSCRIPTIONS AND CHANGES OF ADDRESS
<membership@aggs.org>
AGGS Membership Secretariat
MJ & DB Tyler
P.O. Box 1598
Port Angeles, WA 98362-0194 USA

CONTRIBUTIONS AND INSURANCE
Helen Bortvedt <hmbort@olypen.com>
20 Beeson Road
P.O. Box 2584
Sequim, WA 98382-8870

the
GLOXINIAN
The Journal for Gesneriad Growers
Vol. 48, No.2 Second Quarter 1998

CONTENTS

COVER

Chirita fimbrisepala
(Okuto sp. #3)
Grown & photographed
by Toshijiro Okuto.

CHAPTER PRESIDENTS

California	**American Gesneriad Society of San Francisco —** Katherine Henwood, 819 Linda Mar Blvd., Pacifica, CA 94044-3450
	Culver City — Robert Lindgren, 4819 West 121st Street, Hawthorne, CA 90250
	Delta Gesneriad & African Violet Society — Doris Weaver, 3940 N. Alvarado, Stockton, CA 95204
	Fresno — Sue Haffner, 3015 Timmy, Clovis, CA 93612
	Grow and Study — Denzel Probert, 2215 Santa Ana Ave., Costa Mesa, CA 92627-1835
	Peninsula — JoAnna Behl, 361 Tioga Court, Palo Alto, CA 94306
Colorado	**Gloxinia Gesneriad Growers —** Shirley Mitchell, 2200 Stanford Rd., Fort Collins, CO 80525
Connecticut	**Berkshire —** John Cacase, 1237 Durham Road, Madison, CT 06443
	Connecticut — Margaret Fargeot, 235 Alps Road, Branford, CT 06405
Delaware	**Delaware —** Carol Callaghan, 2806 Rickdale Road, Wilmington, DE 19810
Florida	**Caribbean Basin —** Timothy Anderson, 9995 SW 66th Street, Miami, FL 33173-1446
	Gulf Coast — Patty Dunn, 11510 124th Terrace North, Largo, FL 34648
	Suncoast — Jerry Trowbridge, 181 25th Avenue E., Bradenton, FL 34208
	Tampa Bay — Phyllis King, 11752 111th Terrace N., Largo, FL 34642
Georgia	**Atlanta Gesneriad Interest Group** — William Crews, 5862 Musket Lane, Stone Mountain, GA 30087
Illinois	**Northern Illinois —** Bob Nicholson, 517 E. Seegers Rd., Des Plaines, IL 60016
Kansas/Missouri	**Heart of America —** Grace McCurnin, 6812 Reeds Rd., Overland Park, KS 66204
Louisiana	**Bayou —** Earl Deroche, P.O. Box P, 155 North Airline Avenue, Gramercy, LA 70052
Massachusetts	**New England —** Alice Courage, 1830 Main St. #39, Tewksbury, MA 01876
Michigan	**Southeastern Michigan —** Richard Holzman, 3836 Jennings, Troy, MI 48083
Minnesota	**Twin Cities Area —** Charles Huston, 26 West Tenth St. #505, St. Paul, MN 55102
Missouri	**Gateway West —** Joyan Jackson, 3438 Halliday, St. Louis, MO 63118
New Jersey	**Frelinghuysen Arboretum —** Clarence Eich, 85 Cooper Rd., Denville, NJ 07834
	New Jersey — Marjorie Hemmer, 23 Fulton Street, Bloomfield, NJ 07003
New York	**Gesneriad-Dicts of Western New York —** Fay Wagman, 52 Harper Dr., Pittsford, NY 14534
	Greater New York — Carolyn Ripps, 24 Crane Rd., Scarsdale, NY 10583
	Long Island — Mildred Kiernan, 11 Chester LAne, Farmingdale, NY 11735
Oregon	**Mt. Hood —** Vivian Scheans, 4660 SW Dogwood Drive, Lake Oswego, OR 97035-8412
Pennsylvania	**Liberty Bell —** Laura Shannon, 8845 Norwood Avenue, Chestnut Hill, Philadelphia, PA 19118
Tennessee	**Tennessee —** Carol Ann Bonner, 3705 Tibbs Dr., Nashville, TN 37211
Texas	**Bay Area** — Elsie Pope, 117 Texas Ave., League City, TX 77573-4213
Washington	**Puget Sound —** Ruth Grainger, 2706 Queen Anne Ave. North, Seattle, WA 98109
Washington, D.C.	**National Capital —** John Boggan, 1724 17th Street NW, #64, Washington, D.C 20009
Canada	**Carefree —** Florence Duesterbeck, 2235 Montreal St., Regina, Saskatchewan S4P 1L7, Canada
	Edmonton — JoAnna McDonald, 4329 Riverbend Road, Edmonton, Alberta T6H 5R9, Canada
	Toronto — Daphne Yaremko, #1-211 Pine Valley Dr., London, Ontario N6J 4W5, Canada
Sweden	**Gesneriasts of Sweden —** Ingrid Lindskog, Snickargatan 11, 903 60 UMEÅ, Sweden

Color photos (5) sponsored by the Frelinghuysen Arboretum Chapter in memory of Susan Schlieder

Color photos (2) on page 24 sponsored by Alan LaVergne

Color photo on page 8 sponsored by the Long Island Chapter in honor of their 35th anniversary

Color photo on page 17 (top) sponsored by the Toronto Chapter, in lieu of speaker's fee to Ben Paternoster

Color photo on page 17 (bottom) sponsored by the American Gesneriad Society of San Francisco

ADVERTISERS DIRECTORY

President's Message

Jon Dixon <jond@hooked.net>
55 Tum Suden Way, Woodside, CA 94062

With rain coming down in sheets, the house and greenhouse cool and the light low, I've taken to curling up with a stack of old copies of THE GLOXINIAN. What a fascinating history our Society has had in its forty-eight years. We started out as the "Gloxinia" Society (AGS). In those early days there just weren't that many gesneriads in cultivation. In the sixties as new species were introduced to cultivation, the society changed its name to include "gesneriads" (1966). By the late 60's hybridizers began to discover the possibilities of the new species and genera. At this time the first miniature sinningia crosses were being made. By 1970 the very first *Hypocyrta* hybrids were being described. Now known as *Nematanthus,* those earliest hybrids, such as 'Tropicana', 'Rio', 'Marianne W', are still among the most popular. Due to the limited variety of species, breeders learned early the technique of recrossing, selfing, and sibbing to create the very best out of the genetic stock at hand. The hybridizers in those days were disciplined and thoughtful, and their creations are still nearly as popular today as they were when first introduced.

It's hard to imagine that our old standbys of today were the new, rare, and highly sought after plants of their day. And, those days weren't so long ago. In the late 70's the hottest new hybrid was *Gloxinia* 'Chic', its story typical of many. In those days the rhizomatous *Gloxinia* species were dispersed in a number of genera: *G. gymnostoma* was an *Achimenes*; *G. sylvatica* was a *Seemannia*; and *G. lindeniana* was a *Kohleria*. In the mid-70's a few enthusiasts began to experiment with what were then considered to be intergeneric crosses. Frances Batcheller and Iris August both made a cross of *A. gymnostoma* and *S. sylvatica* (or the form called *latifolia*) which resulted in fertile offspring. While the taxonomists were studying the genetics of these species, Lyndon Lyon began to work with the resultant seedlings. Using the techniques of breeding through several generations of selfings, backcrosses and sibling crosses, he took what were leggy so-so plants to create the compact, vigorous, large red-flowered hybrid so common in collections today.

Looking back over those old copies of THE GLOXINIAN, I see so many names of people still active in AGGS. In the November 1971 issue I found a fascinating well-written column called "Teen Topics". The author, Peter Shalit, is today our Recording Secretary, as well as one of our leading hybridizers. The topic of his column was goals for hybridizers.

Frances Batcheller has been an important part of our Society from its infancy. Today she continues her active interest in AGGS and gesneriads. So it is without sadness but with gratitude for the many years of outstanding service that I announce she has decided to step down as Chairman of the Botanical Review Committee, to be replaced by John Boggan. Happily we look forward to seeing Frances at annual conventions as well as through her writings in THE GLOXINIAN and for many years to come.

Jon

Growings On . . .

As Editor of THE GLOXINIAN, I simply want to let you all know that it really is a pleasure to work on a special issue such as this one featuring the genus *Chirita*. This issue was made possible with the help of many AGGS members who wrote the articles and provided the pictures, as well as by the support of those individuals and chapters who sponsored the many color photos which make this issue even more special. My thanks to you all! In the process of developing this issue, I uncovered some interesting history which I want to share with you.

Over thirty years ago, the book *Gesneriads and How to Grow Them* was published with the fond hopes of editor Peggy Schultz, publisher Elvin McDonald, and its authors, to guide its readers to new adventures with a fabulous plant family, the Gesneriaceae. Frances Batcheller wrote Chapter 11 titled "*Chirita* an Oriental Gesneriad" in which she described the few species of *Chirita* in cultivation at that time and their culture. In 1970 and again in 1982, she wrote extensively about *Chirita* for THE GLOXINIAN. For this special issue in 1998, she has given us an updated look at this genus. Frances, you are an editor's delight. On behalf of our many readers, I want to thank you for all your writings over the years past and for those to come, and for sharing with all of us the many wonders of this plant family.

Chirita sinensis

Back in 1847, long before Frances and AGGS came to be, Paxton's Botanical Magazine in England published this early illustration of *Chirita sinensis* along with these delightful words:

"This charming little greenhouse plant is one of the first results of any importance, from the voyage to China, by Mr. Fortune, on account of the Horticultural Society. It was sent home in a wooden case, and its beautiful large lilac fox-glove-like flowers were open when it arrived....

"Those who see what this is may judge how desirable it would be to obtain from India the other species of the genus, among which are some still finer. And they are all so easily cultivated, that they are just the things to introduce into gardens. Anybody who can grow a Gloxinia can manage a Chirita."

J.K.

Seed Fund

Maryjane Evans <pollin8r>
194 Morris Turnpike, Randolph, NJ 07869

"You've come a long way!" This advertising slogan can also be applied to chiritas. Nine years ago we had only two chirita species listed in the Seed Fund, both annuals. Now we have a wealth of species and hybrids to choose from, thanks to the efforts of members in the US and Leong Tuck Lock, Nagahide Nakayama, Toshijiro Okuto and the Smithsonian Institution. Start growing some today so YOU can enjoy them, too.

We extend thanks to Marcia Belisle, Helen Bortvedt, Mary Bozoian, Carol Callaghan, Ray Coyle, Christian Feuillet, Alan LaVergne, Charles Lawn, Leong Tuck Lock, Ruth Jo McCoy, Toshijiro Okuto, Elizabeth Varley, and Maureen Wilson for their generous contributions to the Fund.

Please note: All of the chirita additions are available in limited quantities and some are in very short supply. In fairness to all, you may order only one of the chirita hybrids. If you wish to order chirita hybrid seed, send a list in order of preference with your order and I'll try to send your first choice. If you don't send a preference list, you will receive a Seed Fund credit.

ADDITIONS

Aeschynanthus hildebrandii
- *Chirita eburnea* (blue) (R)
- *Chirita eburnea* (yellow) (R)
- *Chirita fimbrisepala* (R)
- *Chirita fimbrisepala* #12 (R)
- *Chirita longgangensis* SI94-081 (R)
- *Chirita sclerophylla* (R)
- *Chirita spadiciformis* SI94-087 (R)
- *Chirita* species #3 (R)
- *Chirita eburnea* (blue) × *C. subrhomboidea* (R)
- *Chirita eburnea* (yellow) × *C. sinensis latifolia* (R)
- (*C. fimbrisepala* × *Chirita* sp. #2) × self (R)
- *Chirita subrhomboidea* × *C.* species (Wuhan) (R)

Codonanthe gracilis SI86-148 (B)
Diastema latiflorum GRF9669A (white veins) (D,F,P)
- *Didymocarpus* species #3
- *Koellikeria erinoides* 'Red Satin' (D,F,P)
- *Sinningia* 'Cherry Blush' × self (F,P)
- *Sinningia* 'Mark Twain' × self (F,P)

Sinningia Al Wojcik miniature hybrid mix (F,P)

DELETIONS

Aeschynanthus 'Coral Flame'
Aeschynanthus 'Kew Pink'
Besleria sp. SI95-162
Besleria sp. GRF97129
Chiritopsis repanda
Columnea hirta var. *pilosissima*
Gasteranthus sp. GRF9772
Gasteranthus sp. GRF97152
Kohleria peruviana
Petrocosmea formosa
Rufodorsia congestiflora
Sinningia 'Georgia Sunset'
Sinningia 'Jiminy Cricket'

• denotes LIMITED quantities

Seed Packets — $1.50 each

Please
- Make checks payable to the AGGS Seed Fund in U.S. funds
- To pay by credit card, send your credit card number, expiration date, and signature with your order and indicate if the card is Mastercard or Visa
- Remember to enclose a self-addressed, stamped envelope
- List alternate choices
- Include your membership number (first number on your mailing label)

New Slide Program — The Genus *Chirita*

"You've Come a Long Way!" was Maryjane Evans' comment about chiritas in her Seed Fund column — and so they have. In 1970 when Frances Batcheller wrote her "Gesneriads One by One" article on the genus *Chirita,* there were about 90 species known and only 8 species in cultivation in the US. Now there are about 150 species known and over 30 species and hybrids in cultivation around the world. This new AGGS Slide Program features the old familiar chiritas as well as many of the new species recently introduced which you've been reading about. Also included are some of the first hybrids in the genus *Chirita.*

This new program will be available for viewing starting in July. To request the new slide program with typed commentary, send a check payable to AGGS for $20 to Marlene Beam, 1736 S. Oakland St., Aurora, CO 80012. Specify the date when the program will be shown and give as much lead time as possible. Your request will be acknowledged, and the program will arrive at least one week in advance of your date. You must return the program via Priority Mail insured for $100 within five days after your show date.

Chirita sclerophylla
Grown & photographed by Nagahide Nakayama

Special Contributions

Paul F. Kroll, Corresponding Secretary <pfkroll@worldnet.att.net>
4325 Two Rod Road, East Aurora, NY 14052-9693

FRANCES BATCHELLER ENDOWMENT FUND — $560

The Mines Family
Frances Batcheller, in memory of Dr. Margaret Stone
Long Island Chapter in lieu of speaker's fee to Carolyn Ripps

ELVIN MCDONALD RESEARCH FUND — $30

Bonita Hutcheson, in memory of Dale Denham

FUND FOR PROGRESS/COLOR PHOTO FUND — $1,592.75

Long Island Chapter, in honor of their 35th anniversary
Marlene Beam, in lieu of committee expenses
Arleen Dewell, in lieu of committee expenses
Colleen Turley, in lieu of committee expenses
Susan Grose, in lieu of committee expenses
David Turley, in lieu of committee expenses
American Gesneriad Society of San Francisco
Nancy Hagerman
Greater New York Chapter, in lieu of speaker's fee to Ben Paternoster
Frelinghuysen Arboretum Chapter, in memory of Susan Schlieder
Alan LaVergne
Toronto Chapter, in lieu of speaker's fee to Ben Paternoster

This year, the modern gesneriad grower will be wearing the 1998 AGGS lapel pin. Lemon-yellow *Chirita eburnea* flowers nod from pale green bracts on a dark blue field with "AGGS 1998" written in gold-colored metal to the side. This cloisonné piece is one inch by three-quarter inches and will perfectly accent jeans or a suit. The pins are available for $5.00 from:

Carol Ann Bonner
3705 Tibbs Drive
Nashville, TN 37211-3413

Make checks out to "AGGS, Inc."
AGGS accepts Visa & MasterCard.
The 1997 edition sold out,
so order your 1998 pin now!

Coming Events

April 18-19 — New York — Saintpaulia Society of Long Island annual show and plant sale at St. Mary of the Isle Parish Hall, Park Ave. and Monroe Blvd, Long Beach. Saturday 3:00 to 7:00 pm; Sunday 8:00 am to 3:00 pm. Contact Frances Monuszko, 315 East Walnut St., Long Beach, NY 11561.

May 2-3 — Illinois — Illinois African Violet Society show and sale at the Elgin Holiday Inn, 345 W. River Road, Elgin. Saturday from 1:00 to 5:30 p.m.; Sunday from 9:30 am to 4:00 pm. Contact Jan Bruns (630-837-1298).

May 3 — Massachusetts — Combined Plant Societies' Sale (Begonia, Cactus & Succulent, Gloxinia & Gesneriad, Hobby Greenhouse, Rhododendron) at the University of Massachusetts Eastern Extension Center, 240 Beaver St., Waltham. Also M.H.S. Bookstore, Master Gardeners from M.H.S., perennials, other rare plants. Free parking and admission. Wheelchair accessible. Contact P. Podren (508-658-4652) <getphyl@aol.com>.

The Shopping Mall

HIDDEN VALLEY SINNINGIAS. Over 150 named mini and micro-mini sinningias. $1.00 for list, refundable with first order. P.O. Box 862, Indian Hills, CO 80454. (303) 697-4293.

JUST ENOUGH SINNINGIAS. Catalog $2 (with color photos $5). P.O. Box 560493, Orlando, FL 32856.

Achimenes: $1.50 for list of Achimenes. A few other rhizomes including *Eucodonia, Gloxinia* and *Smithiantha.* List of a few Brugmansias $1.00. KARLEEN'S ACHIMENES, 1407 W. Magnolia, Valdosta, GA 31601-4235. (912) 242-1368.

Carnivorous plants, seeds, supplies, books. Brochure free (Foreign — 2 postal coupons airmail). PETER PAUL'S NURSERIES, Chapin Rd., Canandaigua, NY 14424-8713.

WEISS' GESNERIADS, 'Plants Grown for Distinctive Foliage' — Episcias, Begonias, Sinningias, Chiritas, plants and cuttings. Free Catalog. 2293 So. Taylor Road, Cleveland Heights, Ohio 44118.

Chirita

Frances Batcheller
13 Oyster River Rd., Durham, NH 03824

The genus *Chirita* has increased considerably in popularity in recent years owing largely to the introduction of new species from China.

The first species cultivated in the United States came from the Himalayan region, Sri Lanka, Thailand and Indonesia. *Chirita asperifolia* is still available. It may grow to several feet, not convenient for a light bench, but it produces many white flowers. *C. speciosa (trailliana)* is a very attractive rosette form but does not seem available at present. These plants require warmth and copious amounts of water to flourish.

Of the group from this area of Asia, three annuals did become popular and remain so. *Chirita lavandulacea* can be tall, but produces many flowers of an azure blue with white centers. The stem is watery, thick and erect. The leaves, especially the lower ones, can be quite large. Cool temperatures may keep down the height. It may put out shoots from the base to continue growth after the top dies, but do not count on it — save seed.

Chirita asperifolia
Illustration from Curtis' Botanical Magazine (1847)

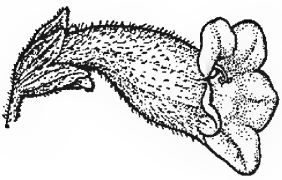
The two small annuals, the very similar *Chirita micromusa* and *C. elphinstonia,* have small but bright yellow flowers. Sometimes they grow as a single-leaved cotyledon or leaf, with the blossoms forming on the midrib like a monophyllous streptocarpus. Occasionally an upright plant is produced. Daylength and temperature may have some influence on growth form. These plants are small enough for use in a terrarium. They are quick to come into flower, but don't forget to save the seed.

A renewed interest in *Chirita* began with the introduction of *C. sinensis.* This variable species from the hills around Hong Kong was brought back to England by Robert Fortune in 1846. It became popular when introduced in the United States because of the flat rosette growth habit and ease of culture. It will stand cool temperatures and limited water. In fact, overwatering is the greatest enemy. It has lavender flowers held on stalks well above the leaf rosette. The buds are first enclosed in yellow-brown bracts. It is also useful as a foliage plant, particularly the silver-marked leaf variety. The leaves are very thick and brittle. The variant 'Angustifolia' has thinner more sharply pointed leaves. This form has been used in the popular hybrids 'Diane Marie' and 'Hisako'.

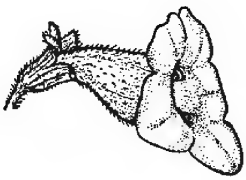
Other Chinese species are also popular, such as *C. eburnea,* with yellow or purple flowers enclosed in large white bracts. *C. subrhomboidea* has a good rosette form with good-sized flowers. *C. linearifolia* is a natural bonsai without effort on the grower's part and flowers frequently. *C. walkerae* has very dark blue-purple blooms; *C. moonii* has the largest flower in the genus. Both these species have woody stems. It is advisable to take cuttings as the plants sometimes die back after flowering.

The AGGS Seed Fund currently offers more than 25 *Chirita* species and hybrids providing ample opportunity for members to grow these plants. With 80 species recorded from China, with a number being tested at the Smithsonian, *Chirita* will continue to be very popular as new species and hybrids become available.

Chirita caliginosa growing on a hillside in West Malaysia.
Photo by Leong Tuck-Lock.



Chirita barbata



Chirita hamosa

Chirita micromusa

Chirita elphinstonia

Chirita lavandulacea

The Cultivated Species of *Chirita*

John Boggan <boggan.john@nmnh.si.edu>
Dept. of Botany, NHB 166, Smithsonian Institution,
Washington, DC 20560

Chirita is one of the larger Old World genera of Gesneriaceae, with about 150 species ranging from Sri Lanka and India through the southern Himalayan foothills into China and Southeast Asia down the Malay Peninsula. Only four species reach the islands of Sumatra and Java, and one more reaches Borneo. The genus is not represented at all in Africa, Australia, Japan, or the Philippines. Most species have very restricted distributions, with the exception of a few weedy annual species. The plants can be shrubby perennial herbs, soft-stemmed annual herbs, stemless perennial rosettes, or diminutive herbs with only one or two leaves. Most have flowers in shades of purple, often with two orange or yellow raised ridges in the throat, but some have white or yellow flowers. The preferred habitat of most species is shaded rocky hillsides or cliffs, often on limestone.

Chirita species differ from several Old World genera by having two fertile stamens rather than four, from *Streptocarpus* in having straight, rather than twisted fruit, and from *Didymocarpus* in having a lamellate or lip-like, usually bilobed, stigma. Species of the related genus *Chiritopsis* have a very short fruit, unlike the elongated capsule of species of *Chirita. Primulina tabacum* is another close relative.

Many *Chirita* species have beautiful flowers and are of easy culture, and are becoming increasingly popular with gesneriad hobbyists. Many of these species have only been introduced to cultivation within the last ten years. In this article I concentrate on these new and lesser-known species, especially the rosette-forming species of section *Gibbosaccus*. For an excellent discussion of some of the older species, see Frances Batcheller's article "*Chirita*" in THE GLOXINIAN 32(5): 17-22.

Chirita taxonomy and nomenclature

Chirita was originally described in 1822 by David Don for a small group of Himalayan herbs, based on an unpublished manuscript name by Francis Buchanan-Hamilton. The name is derived from the vernacular name of one of the species. Since then, both *Didymocarpus* and *Chirita* have grown considerably and the distinction between them has become less clear, leading some taxonomists to consider *Chirita* to be a synonym of *Didymocarpus* (or *Roettlera* or *Henckelia,* two rejected names for *Didymocarpus*). Over the years, several genera have been synonymized under *Chirita: Calosacme, Tromsdorffia, Babactes, Liebigia, Mortsdorffia, Bilabium, Gonatostemon, Damrongia, Ceratoscyphus,* and *Deltocheilos. Chirata* is a rejected variant spelling of the generic name.

Since Don's description included several species but did not indicate one of them as the type of the genus, B.L. Burtt selected the Himalayan *Chirita urticifolia* from among the original group as the type species in 1954. The entire genus was revised by D. Wood in 1974 but this revision suffered from inadequate herbarium and live material. Wood predicted, quite correctly, that a large number of new species would be discovered in southern China. In 1975, Prof. Wang Wen-tsai and his colleagues in China began

revising the Chinese species. The treatment of Gesneriaceae for the upcoming English edition of the Flora of China will include 99 species of *Chirita,* almost 70 of them described since 1980.

Identifying cultivated *Chirita* species

Chirita is taxonomically subdivided into three sections: *Chirita, Microchirita,* and *Gibbosaccus.* This division is based on differences in growth habit and morphological characters, with section *Chirita,* by definition, containing *C. urticifolia,* the type species of the genus. These three groups also differ in their geographic distributions and cultural requirements. On the basis of these differences, a determined splitter could probably recognize three distinct genera.

Most of the cultivated species can easily be assigned to one of these three sections. Along with plant size, leaf shape, and flower color, characters that can be used to distinguish and identify *Chirita* species are whether the plants are caulescent (with a stem) or acaulescent (without a stem), annual or perennial, have leaves that are opposite (two per node) or whorled (three or more per node) or are arranged in a rosette, have a long or short peduncle (flower-bearing stem arising from a leaf axil) or are epedunculate (without a peduncle, i.e., flowers are produced directly from the leaf axils), whether bracts (the small leaflike organs on a peduncle) are present or absent, and their size. In some cases, a cultivated plant can be identified from a Smithsonian Institution accession number or a number given by the AGGS Seed Fund when the species were still unidentified.

Section *Chirita,* with about 45 species, is the most heterogeneous of the three sections and has the widest geographic range, with concentrations of species on Sri Lanka, in northeast India and Nepal, and in southern China. The plants are usually caulescent perennial herbs or small shrubs, but a few are annuals or diminutive herbs with only one or two leaves. The leaves are usually opposite. The flowers are often large and showy. One distinguishing character of many species in this section is that the calyx lobes are more or less fused into a tube. Most are woodland herbs of shaded rocky or hilly areas, but not usually on limestone. Known chromosome numbers are $n = 4$, 9, 10, 14, 16, and 17.

Only one hybrid is known from this group. *Chirita* 'Moon Walker' results from a cross between two closely related Sri Lankan species, *C. moonii* and *C. walkerae,* by Masaki Yamagata.

C. anachoreta [hermit or recluse] is a caulescent annual herb with white or pale yellow flowers. It has a wide range from northeast India through Burma to southern China and Southeast Asia. The chromosome number is $n = 9$. The species was first collected near a Buddhist colony in China.

C. asperifolia [rough leaf] has a long list of synonyms, including *Agalmyla asperifolia, Dichrotrichum asperifolium, Didymocarpus asperifolius, Chirita horsfieldii,* and *Chirita blumei.* It is an unusual and variable species without any close relatives, and it is possible that more than one species has been included under this name. It is a shrubby perennial herb from the Indonesian islands of Java and Sumatra, and requires high temperatures, high humidity, and constant moisture. According to Maryjane Evans, the corolla lobes are white and the tube is a beautiful blue. Although highly regarded by the Elberts in *The Miracle Houseplants,* it has proven difficult to grow and bloom and is rarely seen in cultivation. The chromosome number is $n = 14$ or $n = 16$.

C. briggsioides [*Briggsia*-like] is a small perennial herb from Hubei province, China. Photos by Toshijiro Okuto show pale lavender flowers with dark purple lower lobes. We can only hope that this beautiful species will soon be available in North America.

C. hookeri [named for Joseph D. Hooker] is a small perennial herb with lavender flowers from northeast India. Plants cultivated as *C. hookeri* may actually be *C. urticifolia,* a close relative.

C. moonii [named for Alexander Moon] is a large shrubby species with leaves in whorls of three or four and enormous violet-blue flowers. It comes from Sri Lanka, where it grows on rocky cliffs in moist shady forests.

C. pumila [small-growing] is a widespread caulescent annual or short-lived perennial herb with purple flowers from northern India, Burma, southern China, and Southeast Asia. Despite the name, the plant can grow rather large. The chromosome number of $n = 4$ is the lowest of any known gesneriad.

C. speciosa [showy] is a small perennial herb with pale lavender to purple flowers from northeast India, Burma, China, Southeast Asia. The chromosome number is $n = 9$.

C. urticifolia [nettle leaf] is a small perennial herb with purple flowers, and occurs from northeast India to Yunnan province, China. The chromosome number is $n = 17$.

C. walkerae [named for Mrs. Walker] is a shrubby perennial herb from Sri Lanka with dark purple flowers. The plants grow on rocky cliffs and usually have leaves in whorls of three. B.L. Burtt has recently corrected the spelling to the feminine *-ae* ending. The chromosome number is $n = 9$.

C. zeylanica [from Ceylon] was called "a potential winner" by the Elberts in *The Miracle Houseplants*, but never caught on with growers and may no longer be in cultivation in North America. It is a tall annual or perennial caulescent herb of moist shady areas, often along streams, with purple flowers. As the name implies, this species comes from Sri Lanka (formerly Ceylon). The chromosome number is $n = 10$.

Section Microchirita consists of about 20 species of soft-stemmed caulescent annual or short-lived perennial herbs with opposite leaves. The relatively small yellow, purple, or lavender flowers are often arranged in an unusual epedunculate inflorescence, with a succession of short-lived flowers emerging directly from the leaf petioles. The name refers to the small calyx lobes. This group is fairly well-known, and most of the cultivated species have been around for many years. The group is primarily tropical and is best represented in Southeast Asia and the Malay Peninsula. Most grow on limestone at low elevations. They require warmth, high humidity, and constant moisture. When stressed, some will bloom from the enlarging cotyledon without ever developing any further stems or leaves. Known chromosome numbers are $n = 9$, 17, and 18.

A series of unnamed "Malaysian hybrids" has been produced by Leong Tuck-Lock using wild-collected variants of *C. caliginosa* and *C. sericea*. Seeds from these hybrid crosses have been distributed through the AGGS Seed Fund.

C. barbata [bearded] was described from cultivated plants of unknown origin. It is an annual with blue-violet flowers. The hairy anthers distinguish this species from *Chirita hamosa*, with which it was initially confused.

Chirita eburnea (blue)
Grown & photographed by Toshijiro Okuto

Chirita subrhomboidea
Grown & photographed by Toshijiro Okuto

C. caliginosa [dark or misty] is an annual or short-lived perennial with lavender or purple flowers. Plants now in cultivation come from the Malay Peninsula but this species is also found on Borneo, where it is the only representative of the genus. The chromosome number is $n = 9$. The meaning of the name is obscure.

C. elphinstonia [named for Sir John Elphinstone] is an annual species from Thailand; the orange yellow flowers have dark markings in the throat.

C. hamosa [curved or hooked] is a widespread annual herb with white, pale yellow, or pale lavender flowers from India, Burma, China, and Southeast Asia. The name refers to the shape of the seed capsule. The chromosome number is $n = 17$.

C. involucrata [with an involucre, or several flowers subtended by bracts] is an annual species with purple flowers from Southeast Asia and the Malay Peninsula. The chromosome number is $n = 9$.

C. lavandulacea [lavender] is an annual species with lavender flowers from Vietnam. The chromosome number is $n = 18$.

C. micromusa [tiny banana] is an annual with yellow-orange flowers from Thailand. It is probably closely related to *C. elphinstonia,* but lacks markings in the throat. The seed capsules are supposed to resemble a tiny bunch of bananas. The chromosome number is $n = 17$.

C. sericea [silky] is closely related to *C. caliginosa.* This annual or short-lived perennial with lavender-blue flowers comes from the Malay Peninsula. The chromosome number is $n = 9$. The name refers to the silky hairs on the leaves and stems.

Section Gibbosaccus has about 80 species which are restricted to southern China and northern Vietnam. The greatest concentration of species is found in Guangxi province in China. The name means "swollen pouch" and refers to the shape of the base of the corolla of *C. sinensis.* Species of section *Gibbosaccus* are relatively new to cultivation. The best-known species, *C. sinensis,* was not even mentioned in Harold E. Moore's 1957 book *African Violets, Gloxinias, and their relatives.* Most form acaulescent rosettes, often rather reminiscent of *Saintpaulia* (although, like *Saintpaulia,* many will produce a "neck" with age). Most species are comparable to *Saintpaulia* in size, with the exception of the *C. pteropoda* group. The leaves are usually fleshy and somewhat brittle. The flowers are produced on a long bracteate peduncle that usually holds the flowers well above the leaves. Most grow in crevices on rocky limestone hills and cliffs, which probably accounts for their preference for being potbound, and many are tolerant of cool temperatures in cultivation. In fact, *C. fimbrisepala* and *C. subrhomboidea* have been described by Toshijiro Okuto as tolerating winter temperatures down to freezing. One frustrating characteristic of members of this group is their tendency to produce flower buds that stay small and undeveloped for several months before finally enlarging and blooming. This may be related to the fact that many are seasonal bloomers, and when given cool winters, produce a spectacular show of flowers in the spring from buds formed during the previous growing season.

Many Chinese species have recently been introduced to cultivation in the United States through the Smithsonian Institution, thanks to the collaboration between Larry Skog and several Chinese scientists working on the Flora of China, and through Japanese AGGS members Nagahide Nakayama

and Toshijiro Okuto. All the species described below come from China, but some Vietnamese species will probably turn up in the near future.

The only known chromosome number for this group is n = 18 for *C. sinensis.* However, most of the species can be intercrossed and this section is the current focus of an intensive breeding program by several hybridizers. Several named hybrids are already being distributed, and more are on the way.

The cultivated species of section *Gibbosaccus* can be informally divided into several groups of related species.

The *C. sinensis* group is characterized by large, leafy bracts that enclose the developing flower buds. The plants are small to medium-sized, and the opposite or whorled leaves usually have a distinct petiole.

C. sinensis [from China] has become the most popular and most commonly grown *Chirita* species since its introduction in the 1970's. It is also an extremely variable species, and many of these variants have been given names. The foliage varies in size, width, in the degree of silver markings, and in the degree of hairiness. The leaves can be either opposite or whorled. The names 'Angustifolia' (narrow leaf), 'Latifolia' (wide leaf), 'Latifolia Dwarf,' 'Silver,' and 'Silver Leaf' seem to be primarily descriptive and are meaningless from a taxonomic viewpoint. On the other hand, *C. sinensis* 'Hisako' is a popular cultivar resulting from a hybrid between two of these forms. All forms of *C. sinensis* are unpredictable bloomers, but generally produce flowers in a large flush all at once. The large lavender flowers are held well above the foliage. All collections of *C. sinensis* come from Hong Kong and surrounding areas of mainland China.

C. eburnea [ivory white] is characterized by large "clamshell" bracts that spread like wings as the flowers open. The leaves are usually opposite. This is a variable species and there are two collections now in cultivation, one with large white bracts and yellow flowers and a more recent collection with narrower leaves, smaller greenish bracts and blue-violet flowers. *C. eburnea* has a wide range in southern China.

C. spadiciformis [spade-shaped] is named for its bracts but the leaves are also spade-shaped. Without flowers this species could easily be mistaken for an African Violet, but the leaves usually grow in whorls of 3. The large lavender flowers are produced throughout the growing season, but never in great abundance. *C. spadiciformis* comes from Guangxi province, and plants have been distributed by the Smithsonian Institution with the accession number 94-087.

The *C. pteropoda* group consists of several large-growing floriferous species that produce a long "neck". The leaves are usually opposite and have a petiole that is distinctly "winged" (probably accounting for the name "pteropoda", or "winged foot"). The flowers are produced on a long peduncle with small inconspicuous bracts. The true *C. pteropoda* is not in cultivation in North America; see *C.* sp. 'New York' for plants grown under that name. The species come from Guangxi province or Hainan Island and seem to prefer warmer temperatures.

C. flavimaculata [yellow spot] is the largest rosette *Chirita* now in cultivation, and a well-grown plant can be two feet across. Nevertheless, it is worth growing for its abundant and elegant lavender-blue flowers, which are produced over a long bloom period. This species was described from

Chirita flavimaculata
Grown by Maryjane Evans; photo by John Evans

Chirita tribracteata
Grown & photographed by Toshijiro Okuto

Section
Gibbosaccus

Chirita linearifolia
Grown by Maryjane Evans; photo by John Evans

Chirita sinensis 'Angustifolia'
Photo by Michael Riley

Chirita spadiciformis
Grown by Maryjane Evans
Photo by John Evans

Chirita longgangensis
Grown at the Smithsonian Greenhouses. Photo by John Boggan

cultivated plants that probably came from Guangxi province, and was introduced from China through the Smithsonian Institution with the accession number 94-085. The name refers to the yellow spot on the upper side of the corolla just behind the upper lobes.

C. heterotricha [different hairs] has large shiny dark green leaves with long sparse white hairs. This species from Hainan Island is very similar to *C.* sp. 'New York,' but has white or lavender flowers. A lavender-flowered collection was introduced through the Smithsonian Institution as accession number 94-088. The name refers to two different kinds of trichomes, or hairs, found on the peduncle.

***C.* sp. 'New York'** is a very close relative of *C. heterotricha* and may be merely a form of that species. The pale yellow, nearly white flowers are unusual in the genus. It has a long bloom period and is quite floriferous. This collection has been distributed from the Smithsonian Institution under accession number 85-022. Plants of unknown origin were first grown by AGGS members in New York City as "*Didymocarpus* sp.", and later as *C. pteropoda.* The name 'New York' is intended as a temporary identifier until this plant is properly identified.

The *C. linearifolia* group is a group of small-growing species with narrow leaves. The leaves lack a distinct petiole and grow in whorls of 3 or even 4. Older plants produce a long trunk-like "neck," sometimes with side branches. The bracts are small and inconspicuous. Both cultivated species come from Guangxi province.

C. linearifolia [linear-shaped leaf] is aptly named for its long, narrow leaves. The small pale pink flowers are produced on long peduncles in the spring. It is sometimes grown as a bonsai-like specimen.

C. longgangensis [from Longgang] has leaves that are shorter and wider than those of *C. linearifolia;* the peduncles are also shorter, holding the flowers closer to the leaves. The flowers are very pale lavender, nearly white, with darker lines in the throat, and are produced abundantly throughout the spring and summer and into the fall. This is one of the best of the new introductions given its compact habit and floriferousness. It was introduced through the Smithsonian Institution with the accession number 94-081. The name refers to Longgang County, where the plant was first collected.

Several miscellaneous species of section *Gibbosaccus* are in cultivation.

C. fimbrisepala [fringed sepal] is a variable species and several different collections are now in cultivation. All have opposite, distinctly serrate (toothed) leaves in a tight rosette, very large flowers with speckling in the throat (an unusual character in *Chirita*), and short peduncles with a tendency for the flowers to become trapped beneath the foliage. The leaves vary from dark to pale green and from hairy to glabrous, and the flowers from pale lavender to dark purple. The flowers are usually produced in a spectacular flush in the spring, especially if given a winter resting period. *C. fimbrisepala* has a very wide range throughout southern China. Various collection have been distributed by the AGGS Seed Fund as "*Chirita* sp. #2", "#3", "#4", and "#12". The name refers to the deeply toothed edges of the calyx lobes ("sepals"), an unreliable character in this species despite the name.

C. sclerophylla [thick leaf] forms a compact, tight rosette of leathery dark green leaves, usually in whorls of three, with a pale green or silvery

streak down the middle of each. The peduncle is long, holding the large violet flowers well above the leaves. Like *C. sinensis,* it blooms infrequently and unpredictably, but the flowers are worth the wait. It may prove to be a seasonal bloomer. This species from Guangxi province has been distributed by the AGGS Seed Fund as "*Chirita* sp. #1" and by the Smithsonian Institution as accession number 95-133.

C. subrhomboidea [not quite rhomboid] is probably a close relative of *C. fimbrisepala.* As in that species, the lavender flowers of this spring bloomer are quite large, but lack markings in the throat, and the leaves do not have serrate edges. This species from Guangxi province tolerates low winter temperatures. The name supposedly refers to the shape of the leaf.

C. tribracteata [three bracts], from Guangxi province, is characterized by having three bracts on the peduncle, rather than the normal two. The flowers are violet. This species has been distributed by the AGGS Seed Fund as "*Chirita* sp. #10".

For more information on *Chirita:*

Batcheller, F. 1982. *Chirita.* THE GLOXINIAN 32(5): 17-22.

Boggan, J. 1997. Names for Chiritas, Old and New. THE GLOXINIAN 47(2): 11-13.

Boggan, J. 1997. *Chirita:* A Taxonomic Overview. URL http://home.pathcom.com/rmyhr/artchiri.htm. [An earlier version of this article with excellent color photos of nearly all the cultivated species on Ron Myhr's Gesneriad Reference Web (URL http://home.pathcom.com/rmyhr).]

Sleeth, N. 1992. Meet the Chiritas. THE GLOXINIAN 42(3): 8-12.

Wood, D. 1974. A revision of *Chirita* (Gesneriaceae). Notes Roy. Bot. Gard. Edinburgh 33: 123-205.

Chirita lavandulacea

Chirita barbata

Chirita pumila

Chirita eburnea (yellow)
Grown & photographed by Bob Stewart

Chirita heterotricha
Grown by Maryjane Evans; photo by John Evans

Chiritas Cheery in a Chill

Alan LaVergne <Alan_LaVergne@iacnet.com>
2369 Saint Francis Dr., Palo Alto, CA 94303

John Boggan has observed that the species in the "rosette" section of *Chirita* resist cold better than the species in the other two sections. This is consistent with my experience.

Where I live has a fairly mild climate by U.S. standards. Therefore, I try growing almost everything outdoors, even episcias and African violets. If I've got an extra plant of something, it will endure a winter outside in the interests of horticultural knowledge; therefore, I've accumulated some practical data on the cold tolerance of chiritas and other gesneriads.

Climate details: Palo Alto (about 30 miles south of San Francisco, California, not far from San Francisco Bay) can have frosty nights in the winter, but daytime highs are rarely below 40°F (about 4°C). The chilliest winter night is usually about 28°F (-2°C), although there have been exceptions (our "Big Freeze" was Christmas 1990, with freezing daytime temperatures—a terrible shock to us semi-tropical Californians). Last winter (1996-97) we had one night cold enough to kill geraniums back to the ground and freeze the top 3/4 inch (2 cm) in 30-gallon water barrels. This year (1997-98) we have already had several nights frosty enough to damage a number of tender plants. I apologize for going into all this detail, but I hope it will provide some context for the hardiness data I am about to record.

The following chiritas have endured one or more winters of that regime:

Chirita sp. 'New York' (what I call "oga-pterapoda", where oga = once grown as)

C. subrhomboidea

C. heterotricha (a species with many similarities to "oga-pterapoda")

C. 'Diane Marie' (a *C. sinensis* hybrid)

C. "species #2" (from the AGGS Seed Fund)

On the other hand, *Chirita walkerae* (from the "stemmed" section of *Chirita*) failed to survive a Palo Alto winter outdoors. And I had none of these plants during the Big Freeze.

I have two chiritas planted directly in the ground (both "oga-pterapoda"). There is good news and bad news about this experiment. On the good side, the plants don't have any trouble with the temperature, even when the ground is completely soaked for weeks at a time. The bad news is that we aren't the only creatures to enjoy chiritas: some as yet unidentified vandals keep eating all the leaves. Currently, these two plants are stalks with a bunch of leaf stumps, and would be hard to spot except for the many spent flowerstalks. (A potted plant of *C. heterotricha* was also getting eaten until I moved it into a location further from the turf.) On the other hand, these poor heavily chomped plants bloom much more abundantly than the pampered big-leafed plant in my air-conditioned office.

The remaining outdoor chiritas are in pots in the back yard, some with shelter from rain, but none sheltered from wind or cold.

The upshot: if you have extra plants of these rosette chiritas, give them a try outdoors, even in climates harsher than mine. You won't know what they can't survive until they don't!

1998 AGGS Tee Shirt

The crowds at the runways of Paris and New York are abuzz about the newest fashion in casual wear — the 1998 AGGS tee shirt! In fuchsia, white, black and shades of green, the initials of the American Gloxinia and Gesneriad Society blossom on an ash gray shirt of 100% cotton, available in large, extra large, and extra-extra large sizes. Only 100 will be printed, so order yours today! Send $15 per shirt, and remember to include your size with your order.

Make checks payable (in U.S. Funds) to AGGS, Inc. To pay by credit card, specify Visa or MasterCard, include the credit card number, expiration date, and your signature with the order.

Mail to:

Carol Ann Bonner
Publicity Membership Promotion
3705 Tibbs Drive
Nashville, TN 37211-3413

The Gloxinian

INDEX 1997

Volume 47 **Numbers 1–4**

Compiled by Judy Becker

Issue is indicated first, followed by a colon, and then page number(s).
Plant illustrations are indicated by an asterisk (*)

Chirita sinensis 'Silver'
Grown & photographed by Bob Stewart

Rosette Chiritas — Half-Hardy Gesneriads

Toshijiro Okuto <okuto@hk.sun-ip.or.jp>
Bingo 178-1-1-301, Kakogawa-cho, Kakogawa,
Hyogo, 675-0032, Japan

There are more than 60 *Chirita* species in the botanical book published in China, most of which are so-called rosettes with no stems or short stems. Among them, perhaps a dozen species are in cultivation in Japan. I used to grow chiritas in a greenhouse with a minimum temperature of more or less 15°C (59°F) at the Hyogo Flower Center in Kasai, Hyogo. Chiritas have a tendency to bloom irregularly with a few flowers at a time under these conditions, so I didn't think chiritas were very good plants. When I was transferred to Awaji Island a while ago, I carried some chiritas with me, and I was forced to grow them without a greenhouse. I grew them at a south-facing window in a heated room where night temperatures usually went down to 5°C (41°F) and nearly to 0°C (32°F) occasionally in winter. Under these conditions, the plants made a lot of buds in the axils in the fall. During winter the buds stayed dormant, and the margins of the outer leaves dried out. But they made a flush of bloom in spring when the stalks with many buds grew out and bloomed all at once. It was really splendid. This made me look at chiritas with fresh interest.

After two years at Awaji, I came back to the Hyogo Flower Center again. I'm now growing chiritas in the plastic house there without heat, and I also grow a few on the porch of my home in Kakogawa, 20km south from Kasai. Both in the plastic house and on the porch, temperatures usually go down to 5° to 0°C, a little colder than at Awaji in winter. Chiritas grow and flower in the same way they did at Awaji, although I have to move them from the porch to inside occasionally when the weather people forecast a cold wave. One night last winter when the temperature went down to -5°C (23°F) on the porch, I neglected to move them inside and all of the chiritas there were heavily damaged. They didn't die but some leaves and buds turned black and later became mushy so that I only had a few or no flowers on some of the species on the porch this year.

In half-hardy conditions like that, many chiritas tend to flower once a year at a specific season, mostly in spring. Seasonal flowering is, I think, a characteristic of many, not all, rosette chiritas. Rosette chiritas come from southern China, from warm temperatures to sub-tropical regions, where they grow under more or less seasonal changes of climate. Low temperatures stimulate the flowering of chiritas in the following season. I have often heard that many buds were formed on chiritas but none of them or only a few came to bloom. This happened to me when I grew them in the greenhouse, too. I think it is due to insufficient low temperatures.

By the way, some of you might think that damaged leaves or blooming only at a specific time of year are inappropriate for show plants. In that case you will be able to avoid the leaf damage and still have the low-temperature affect by keeping night temperatures at 5°C or a little higher in winter. You might as well choose species or varieties of "unseasonal" flowering habit. *Chirita sinensis* and its varieties — 'Angustifolia', 'Latifolia' and 'Hisako' —

have a tendency to flower unseasonally more than other species as far as I know. 'Aiko' is a good bloomer as the buds appear one after another and plants bloom almost all year round in the greenhouse.

I use a mixture of equal quantities of vermiculite, peat moss and Hyuga-suna, a kind of volcanic sand, not only for chiritas but most gesneriads and sometimes add grain ceramics of diatomite (Isolite is the commercial name of this ceramic) to this mix for good drainage. (You can see Hyuga-suna used for *Saintpaulia ionantha* and *S. tongwensis* on Ron Myhr's Gesneriad Reference Web.) I usually grow chiritas in clay pots but haven't seen any bad trouble even in plastic pots.

Not many people grow chiritas in Japan. Only a few alpine plant or gesneriad enthusiasts are growing these lovely plants. We have problems identifying *Chirita* species because most of them came from China without labels and commercial growers give them temporary Japanese names. I am trying to identify them by consulting the Chinese botanical book "Flora Reipublicae Popularis Sinense Vol 69", 1990, which is devoted to Gesneriads and a few other families native to China, but I haven't identified most of them yet. I have hybridized chiritas, too. Among my hybrids, *Chirita* 'Aiko', *C.* 'Keiko' and a few unnamed hybrids are being grown in other countries, too.

Here are some notes on my chiritas:

Chirita fimbrisepala — has hairy leaves, flowers in spring and is not a good bloomer. It was introduced under this name from the Botanic Gardens in Guangdong, China. I suspect that this might be a different variety than the *C. fimbrisepala* grown in the US, although I haven't seen it.

Chirita eburnea (yellow flower) — has big bracts and blooms in early summer. It was also introduced from Guangdong along with *C. fimbrisepala.* The yellow color of this species can be passed on by hybridizing.

Chirita eburnea (blue flower) — has big bracts, too, and blooms at almost the same time as the yellow *C. eburnea.* It was distributed in Japan as a species from Sichuan, China. I sent seed with the name "*Chirita* sp (from Sichuan)" to the AGGS Seed Fund some years ago and heard that a Chinese botanist identified this as *C. eburnea* by the photo of a plant grown from this seed.

Chirita subrhomboidea — is a compact and floriferous species that makes a flush of bloom in the spring. I think this species has good qualities as a hybrid parent.

Chirita tribracteata — has three bracts as you can imagine from its name. It bears small pink flowers sparsely in late summer. This is the same species as *Chirita* sp #10 from Nakayama.

***Chirita* species #2 and #3** — I had sent two unknown species with these numbers to the Seed Fund, but Nakayama told me that he had sent different unknown species with the same numbers so it might be possible that different species were distributed with the same number. I have to apologize for that. Please look at Ron Myhr's web site as photos of my *Chirita* sp #2 and *C.* sp #3 are on the site and confirm which one you have. "My" species #3 might be *C. fimbrisepala* according to identification by John Boggan. That might be true, and I figure that "my" *C.* sp #2 might also be the same species. The differences among these three appear to be variations within the one species.

Chirita 'Aiko'
(*C. eburnea* [yellow] × *C. subrhomboidea*)
Hybridized and photographed by Toshijiro Okuto

Chirita 'Keiko'
(*C. subrhomboidea* × *C. fimbrisepala*)
Hybridized and photographed by Toshijiro Okuto

Chirita briggsioides — the flower is bicolored with white upper lobes and purple lower lobes. It blooms during summer. Its calyx is divided halfway to the base so that a calyx tube is formed. This is the big difference from the other rosette species in cultivation, all of which have no calyx tubes. The leaves are thin and hairy. I self-pollinated it and also crossed it with other species, but haven't gotten any seeds yet.

Chirita speciosa — a small plant that blooms during the summer. Compared to the plant size, the flowers are big with yellow lobes and a purple tube. It has a calyx tube, too. Leaves are thin and pale green with bronze markings. This species was collected in Yunnan, China at an altitude of 800m last year. It hasn't produced any seeds yet. This species is close to *C. briggsioides,* but I don't know much about its habits as I haven't had much experience with it yet.

Chirita 'Aiko' — *C. eburnea* (yellow) × *C. subrhomboidea.* This hybrid is vigorous and a good bloomer with yellow flowers. It blooms throughout the year under warm conditions.

Chirita 'Keiko' — *C. subrhomboidea* × *C. fimbrisepala.* This hybrid looks more like *C. fimbrisepala,* but is floriferous like *C. subrhomboidea.*

Chirita Discussions on the Internet

Chirita has been a hot topic of discussion on Gesneriphiles for the past several months. Here are some comments from growers around the world:

Joshua Spece started: "I only have one Chirita—*Chirita sinensis* 'Hisako'. It is about 8-10" across right now. Can you give me a little more info about this plant? How big does it get? When will it bloom? What are the flowers like? Is it an annual or perennial?"

Christel Collier of Florida responded: "Glad your chirita is doing well. It will get bigger as in 20-25" across. It's like a violet, it will be with you as long as it likes your treatment. It blooms several times a year but the flowers take a long time coming. The buds grow very slowly and you can see them. Give it as much light as possible. I have mine under the lights. Some people here in Florida grow them outside, I haven't tried that. Overall, treat it like a violet and it will be grateful to you. Oh, the flowers when they finally open, are pale lavender-blue, very nice and stay on quite a long time."

Wallace Wells of New York added: "The ultimate size of 'Hisako' will be determined by the size of the pot you grow it in. You will get altogether different size plants depending if you grow it in a 6", 8" or 10" pot. All will be healthy and potentially bloom.

If you are growing in a house or apartment, you will have to increase the aerial humidity by misting in order to get flowers. Better yet, place the plant in a terrarium. At normal indoor humidity, the flower buds stay small and remain next to the leaf axils where ultimately they dry up. 'Hisako' is most admired as a foliage plant. The flowers are interesting (to me) but not really beautiful."

Nathanael Simonsson in Sweden commented: "It seems that *Chirita sinensis* 'Hisako' is very common in the U.S., but the true *C. sinensis* seems to be the commonest type of chirita in Sweden.

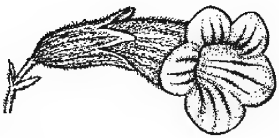
I grow my chiritas in different ways. Some are erect and tall (up to one meter!) and others form basal rosettes. I grow my basal-rosette chiritas at windows and under lights. In Sweden, they are very easy to flower—maybe it is the shorter days that we have in autumn and winter.

My erect and tall species are harder to grow, they want to grow with much water (not all but many which I grow) so I have them in a terrarium. I think basal-rosette chiritas are much easier than the erect/tall chiritas, so I'm recommending basal-rosette chiritas."

Aneita Richardson in California asked: "I have a question about a chirita that I have . . . it was labeled *Chirita sinensis,* but if it is, it is a plain leaved variety. It has somewhat more fuzzy leaves than does 'Hisako'. They are more rounded in the juvenile stage. It can get large and form a huge rosette. The blooms are a light lavender, and I think there is a yellowish to golden spot in the throat. It holds the blooms high above the foliage. My question is, I guess, is there a plain leaved variety of *sinensis*?"

John Boggan in Washington, DC responded: "Yes, *Chirita sinensis* is a very variable species. It has both plain green and silver-marked forms, and

Section *Chirita*



Chirita urticifolia

Chirita walkerae
Grown at Cheekwood Botanical Gardens
Photo by Jonathan Ertelt

Chirita hookeri
Grown & photographed by Toshijiri Okuto

Chirita anachoreta
Grown at Cornell; photo by M.H. Stone

Chirita moonii
Grown by Maryjane Evans; photo by John Evans

Chirita speciosa
Grown & photographed by Toshijiro Okuto

Chirita briggsioides
Grown & photographed by Toshijiro Okuto

the leaves also differ in size, width, shape and fuzziness. *C. sinensis* 'Hisako' is a hybrid between two of these different forms. The silver markings are not a form of variegation, and can be inherited from either parent. It is also a dominant trait, and I have some very interesting hybrids from crosses with other species coming along that show this silver patterning."

John Boggan also offered these comments on repotting chiritas and light for chiritas: "I had a *Chirita sinensis* 'Hisako' for about three years that I NEVER repotted. It looked beautiful and bloomed about twice a year. I am convinced that the rosulate chiritas like to be kept potbound and infrequently repotted. I finally got rid of it when I was making room for new plants. I dismembered it and gave away all the leaves—chiritas are very easy to grow from leaf cuttings!

Most chiritas do quite well in relative low light. I have been growing them in a bright north-facing window, which never gets direct sun, and have good growth and bloom. I haven't grown them under artificial lights, but I know others have had good luck that way. I would say just a little more light than African violets should be enough. They also tolerate cooler temperatures than violets. They do tend to be seasonal, and grow very slowly in the winter, putting out a good flush of bloom in the spring and summer. This is especially true of *Chirita fimbrisepala. C. sinensis* and its various cultivars bloom infrequently, and only when they are good and ready, but usually have a lot of flowers open at once. *C. longgangensis* and *C. spadiciformis* bloom continuously through the spring and summer in the Smithsonian greenhouses.

General chirita culture is bright indirect light, well-drained soil with extra lime, a little on the dry side, and keep them potbound! They will grow quickly as seedlings, but much more slowly when they are larger. They are also very easy to propagate from leaf cuttings.

These comments refer to the smaller rosette chiritas. If you're growing some of the larger, shrubby chiritas, they may need more light and warmer temperatures.

I have not found that chiritas need extra humidity. Then again, extra humidity probably wouldn't hurt, as long as you don't keep the soil too wet.

Again, my experience is almost entirely with the rosette species from southern China. I have not grown the annuals, and I am struggling with *C. asperifolia*, which I suspect does need more warmth and humidity."

Maryjane Evans of New Jersey wrote: "I started growing *Chirita asperifolia* in 1991. I received a plant of this species from Elizabeth Varley when the gesneriad collection at Longwood Gardens was dispersed. It flowered for several years each summer, bearing beautiful flowers in axillary clusters. The flowers have a deep blue (true blue, not purple) tube and a clear white limb. I had very limited success in setting seed. The pollen sacs didn't open freely and the stigma was often deformed or aged prematurely. I don't know if this was due to improper culture or a clonal defect. The plant declined rapidly in 1995 and I took cuttings before it died. The plants grown from these cuttings haven't flowered yet.

This plant was grown under the bench in a shaded location in the summer and moved to the top of the bench (for warmth) in the winter. The leaves were a medium to dark green. It was grown in Pro Mix B with no lime added. It grew best in the summer when the temperature and humidity were higher."

Richard Trout in Australia wrote: "My chiritas grow indoors, and I have found the leaves are easily marked so they may not enjoy it outside. For a time I grew my chiritas in a terrarium but it was suggested to me that they probably don't need the extra humidity. I did find that leaf bracts formed when in the terrarium but this could have easily been the result of the warmer weather in our summer. I find 'Hisako' most enjoyable for its foliage, and although the leaf bracts have formed, they are developing slowly (hopefully in time for out annual show!)."

From **Cheaw Hon Ming,** Chairman of the Malaysian Nature Society, Perak Branch: "Can't help but to give my 2 cent bit. Leong Tuck-Lock did indeed use different varieties of *C. caliginosa* and *C. sericea* to breed the Malaysian Mix [previously available in the Seed Fund]. We collected these together and found that while *C. caliginosa* has larger and darker blue flowers, it grows tall and straggly on the base or lower parts of limestone hills around our hometown. It is thus less sun loving and enjoys a wetter cooler environment. We found *C. sericea* growing on the drier limestone cliffs and so are more hardy although found growing in the shadier parts usually on the east-facing cliffs or caves. As it is a short bushy plant, Tuck-Lock tried to breed a shorter plant than *C. caliginosa* but with stronger colours especially hoping for a more yellow throat than the *C. sericea* plant.

In the wild both *C. caliginosa* and *C. sericea* will dry out during the extremely hot and dry periods when the sun shines directly on them. *C. caliginosa* will then behave like an annual and dry up. However, they will sprout new leaves when the rains come. *C. sericea* can normally stand more severe drought and heat as it is covered with more hairs and the leaves are smaller hence the silky (sericea) feel."

Discussion on chiritas then led to the question of "What is your favorite chirita?"

Ruth Zavitz of Southern Ontario responded: "I think *C. eburnea* is my favorite of these although 'Hisako' has the best foliage. The Malaysian hybrid is very free flowering but tends to yellow bottom leaves and is rather rangy. *C. moonii* also tends to stretch and while the foliage is beautiful (before it yellows) and the flowers are huge, it rates rather far down the list although it may be that I need more experience growing it."

Vivian Scheans of Oregon replied: "My very favorite chirita is *C. eburnea* because of the calyx and yellow blossoms. I've had as many as 6 or 8 blossoms coming out of a bract and it was indeed spectacular. My least favorites are the annuals, and I've grown many of them. It is probably basically because I'm lazy and don't like having to start all over again after they bloom. The chirita with the form I like best when not in bloom is *C. linearifolia.* I love the various configurations it will grow into, like a wonderful bonsai, without working at it."

Norah Otto of Colorado wrote: "My favorite chirita is *C. eburnea,* then *C. pteropoda* (or sp. 'New York'?), then *C. sinensis* 'Hisako'. I never met a chirita I didn't like. I have cold conditions.

Aneita Richardson in California commented: "My favorite chiritas are the four I grow at present: *Chirita sinensis* 'Hisako' (beautiful huge leaves with silver markings; bloomed easily); *Chirita sinensis* (a plain green vari-

ety); *Chirita sinensis* 'Angustifolia' (narrower leaves, more compact growth, with more colorful blooms); *Chirita eburnea* (strange yellow blooms peeking out of a heart-shaped, clamshell-like bract, very other worldly looking). They all seem to like my cooler temperatures. I do prefer the perennial types, because I enjoy having a plant with me for years. They become old friends."

Wallace Wells discussed his favorite chiritas:

"1) *Chirita* 'Diane Marie', the Goldilocks of chiritas, has the best combination of leaves and flowers. Beautifully silver-veined leaves and, when it suits itself, many raspberry colored flowers. I should mention that my chiritas bloom frequently following repotting after being root-bound in the pot for awhile. Also, one should fertilize chiritas with one half to one quarter the amount used on other plants since they will resent more than that and reward one with off-colored leaves.

2) *Chirita* 'Hisako': I only grow this one for the leaves which are special. The flowers look funny, although I don't pick them off. This one would be nice in a reception area in an office. Low light, low humidity; a winner for public and private spaces.

3) *Chirita "pteropoda".* Whoever named this one was far amiss; *chryosarista* would have been better since it looks like a shower of golden stars when it is in full bloom."

From the U.S. to Canada, Sweden, Malaysia, Australia, and back again, the discussion on chiritas continues ....

Chirita sinensis
Grown by Altair Cooke; photo by Gerard Vriens

GRF Tour of Madagascar and Wahroonga in 1999

Dr. Hans Wiehler, Gesneriad Research Foundation
1873 Oak Street, Sarasota, FL 34236

Next year, in the spring of 1999, the GRF is planning an expedition to Madagascar in search of odd species of *Streptocarpus.* The trip will start in Miami, take us to Capetown, South Africa (short excursion there to its famous botanical garden), to Durban (two-day excursion to Wahroonga, Martin Kunhardt's famous streptocarpus collection, and a guided tour of wild streptocarpus in the countryside) and finally, with Martin, to the nearby capital city of Madagascar, Tanarive. We will tour this fascinating island by rented bus.

Estimated cost of this extraordinary GRF expedition is $4,000. Because of the high cost of the tour, we are announcing this trip a year early. If you are interested in being part of this historic expedition, please start saving your pennies. We will very likely have gesneriad people from Japan and Sweden with us. And, please, let the GRF know that you are planning to come along by July 1, 1998, or before. We need at least 16 people to attend this expedition, otherwise we cannot go. Where are all the streptocarpus-interested folks?

Why is the GRF sponsoring such a trip? There is no other gesneriad organization doing it. The rainforests in Madagascar are fast disappearing. We hope to find among the odd *Streptocarpus* there some species that will hybridize with wild species of African *Saintpaulia* (African violets), thus connecting the two great African gesneriad genera. Who will do the cross? And we would like to introduce Madagascarian gesneriads into cultivation before they become extinct. Are these enough reasons?

Are there at least 16 streptocarpus-interested people out there? The internet tells of more.

Chicago Is ... *Your* Kind of Town!

Al Wojcik, Local Convention Chairman <awojcik@ibm.net>
9693 Carter Ave., Allen Park, MI 48101-1338

The Northern Illinois Gesneriad Society looks forward to welcoming you to Chicago July 1-4 for our 42nd annual AGGS Convention!

One of the most difficult tasks faced by the Local Convention Committee was trying to decide where to go on the tours. In a place like Chicago, there are just so many places to go and things to see that I could fill up this entire issue just listing them. So we finally decided on two tours.

The first tour will take us to Oak Hill Gardens and Hausermann Orchids, two of the more interesting commercial plant growers in the area. Lunch will be at the Rainforest Café. If you've never had a meal there, you're in for a real treat!

The second tour will feature a comfortable bus ride into the heart of the Chicago museum district. Within easy walking distance are the Field Museum, the Adler Planetarium, the Chicago Art Institute, the Shedd Aquarium and the Museum of Broadcast Communication. We'll supply the maps. Lunch is on your own, but "A Taste of Chicago" will be taking place nearby that week, so stroll on over and eat your way through 65 booths operated by Chicago's finest restaurants. The tour costs just $20, which is a real bargain (that's about one day's parking in downtown Chicago!).

On Saturday, July 4th, we'll be heading out to the Chicago Botanic Garden. Explore fifteen separate gardens (including a dwarf conifer garden, an English walled garden and an aquatic garden) and stroll through several greenhouses filled with tropical and succulent plants (see if you can find the gesneriads scattered throughout the growing areas). Hopefully you'll work up a good appetite, because for dinner we head to the 94th Aero Squadron for a full buffet. This unique restaurant features a French farmhouse/World War I theme. The only things missing from the decor are Snoopy and the Red Baron! Then it's back to the hotel for the Social Get-Together hosted by the Northern Illinois chapter.

If you'd like to get out and explore Chicago on your own, there is an elevated train station (the "Rosemont" station) located one block from the hotel. Chicago public transportation is one of the cleanest, safest and most efficient in the world. The Chicago Transit Authority has an excellent web site <http://www.transitchicago.com/> featuring maps, fares and other information to help you plan your explorations. The CTA can also be reached at 312-836-7000.

If you want to explore Chicago by car, a rental agency is available in the hotel lobby.

If you're driving into Chicago for the Convention, there's free parking at the hotel.

If you're flying into O'Hare, just look for the Holiday Inn O'Hare International shuttle buses. The hotel is about 10 minutes from the airport. The shuttles run every 15 minutes and are free.

To help you plan your trip, feel free to contact the following Chicago tourist information sources:

Chicago Convention and Tourism Bureau: 312-567-8500
Web site: http://www.chicago.il.org/
Chicago Office of Tourism: 312-744-2400
Web site: http://www.ci.chi.il.us/tourism/
Illinois Bureau of Tourism: 1-800-2CONNECT
Web site: http://www.enjoyillinois.com/

Along with your registration confirmation, we'll include a list of plant places in the Chicago area. If you have a particular interest other than plants (antiques, books, etc.) feel free to drop me a note and I'll try to find the best places to visit.

We will do our best to have the newest and best gesneriad plant material available at our Plant Sales tables. And we'll try to have something new every time the sales room is open! (I hate it when all the good stuff is gone after the first day!) And since almost everyone in AGGS grows plants OTHER than gesneriads (come on, admit it) we'll have a nice assortment of non-gesneriads for the plant connoisseur.

Some important dates to remember:

June 8 — Deadline for hotel reservations (Holiday Inn O'Hare International, 1-800-HOLIDAY for reservations. Be sure to mention AGGS)

June 10 — Registration deadline for the Judges Training School (contact Ben Paternoster, 14 Coptor Court, Huntington, NY 22743-2335 to register)

June 14 — Convention registration deadline. $25 charge on registrations received after this date. Tours/meals on a space-available basis after this date. Questions concerning registrations can be directed to Nancy Maybloom, 1955 Fairway Court, Hoffman Estates, IL 60195, 847-882-4652, or Hsmay@aol.com.

June 14 — Deadline for Flower Show Artistic Classes (contact Jane Miller at 630-834-9492 to reserve space)

And don't forget about the Frances Batcheller Endowment Fund Auctions! Rumor has it that there will be some unique and extremely rare plant material available for auction.

We look forward to welcoming everyone to Chicago this July!

Think AGGS Auction ...

. . . when potting your gesneriads, cleaning up the attic, shopping and browsing, packing for Convention. Start looking for donations that are gesneriad and/or horticulturally related to send or bring to Convention, especially live plant material, to benefit the Frances Batcheller Endowment Fund.

Support AGGS — First Donate, Then Bid!

New Collections of African Violet Species

Note: Dr. Smith will be the guest speaker at the GHA meeting being held on July 1 in Chicago. He will be showing slides (and plants?) of several of the new clones described below and will be discussing his thoughts on their taxonomic status and possible new species.

Dr. Jeff Smith <06jlsmith@bsuvc.bsu.edu>
The Indiana Academy, Ball State University, Muncie, IN 47306

The species *Saintpaulia* plants generally available in the United States and Canada appear for the most part to be identical genetic clones of one original plant of that species. Consequently, there is little difference in appearance between plants of the same species as most plants have been reproduced by leaf cuttings from the same original species plant.

Over the last 2-3 years, I have been working with *Saintpaulia* species plants from new genetic sources. The two primary sources are the Mather collection and the Uppsala Botanical Gardens.

The Mather collection is a group of *Saintpaulia* plants collected by the late Sylva Mather of Nairobi, Kenya. Mrs. Mather either collected the plants personally or obtained them from other individuals. After her death in a car accident in 1992, the plants were kept alive by her family and gardener, then dispersed to the Royal Botanic Gardens of Kew and to Dr. Jonathan Wendel at Iowa State University. I received my plants of the Mather collection from Dr. Wendel.

The plants in the Mather collection represent a number of new genetic clones of *Saintpaulia* species. Two of the plants, *S.* Robertson and *S.* white *ionantha* were released to the public by Genola Cox (Violet Express) in 1993. *S.* Robertson represents a new *Saintpaulia* taxa collected in Kenya by Anne Robertson (Kenya National Museums) and may prove to be a new species. *S.* white *ionantha* has a less certain origin, but is likely a genetic variety of *S. ionantha.*

The Uppsala Botanical Gardens have a number of *Saintpaulia* species that were collected during a foreign aid campaign in the 1980s. Cuttings of these plants were obtained by Dr. Wendel, where I got my copies. Several of these plants represent new genetic clones of various *Saintpaulia* species. In fact, almost all of them are different than the U.S. clones of the same species. These plants do have known collection locations.

In addition, I have several other *Saintpaulia* plants that have been sent to me by private individuals. One of them was collected by a member of the Uppsala Botanical Garden, but was sent to me directly, not through Dr. Wendel. This plant is from the Nguru Mountains of Tanzania. Although it was originally identified as a *S. shumensis,* I have reason to suspect it might be a new genetic dwarf species. Another plant supposedly from Kew is labeled as *S. ionantha,* but has near-girl foliage on a miniature. Both of these later plants promise new genetic material for hybridization.

These new plants represent a critical genetic pool for future conservation efforts of *Saintpaulia.* They also represent a source of new genetic material for hybridization studies. For example, I have crossed the Mather plant No. 21 (new species? or possibly a new clone of *S. magungensis* var.

magungensis) with several cultivars. The species plant has good creeping semi-miniature plant growth with almost black foliage. The F1 hybrids are showing similar growth forms, but haven't bloomed as yet. I'm hoping to get some nice blooms on the plant type of the species. Should be very interesting if it works.

Chirita lavandulacea
Seed Capsule

1998 AGGS Chicago Convention Lectures

"Gesneriads in Neurological Disease Treatment: Ethnobotanical and Biochemical Research" — Dr. Ethan B. Russo, Department of Neurosciences, Western Montana Clinic, Missoula, Montana. A recent recipient of a research grant from AGGS, Dr. Russo will discuss the medicinal uses of gesneriads among the Machiguenga tribe in the Peruvian Amazon. The program will include slides taken on ethnobotanical expeditions to Peru and will focus on the forests, the Machiguenga people and the animal life of the region. A less technical discussion of his biochemical efforts to date on gesneriads will follow.

"Gesneriad Greenhouse Growing" — Bob and Dee Stewart, Stow, Massachusetts. The Stewarts are well known for the blue-ribbon-winning plants they have exhibited at AGGS Conventions and local plant shows. They will present a slide tour of their greenhouse and share with us their secrets for growing some of the more difficult and unusual gesneriads.

"The Legacy of Bill Saylor" — Dr. Laurence Skog, Research Scientist and Curator, Department of Botany, Smithsonian Institution, Washington, D.C. Dr. Skog will talk about the hybridizing research and plant introductions made by the late Bill Saylor. Among Bill's best-known hybrids are the intergeneric ×*Codonatanthus* crosses as well as several hybrid *Nematanthus* and *Sinningia*. Dr. Skog's program will feature slides from Bill's personal gesneriad slide collection which was donated to the Smithsonian Institution.

"Anything But Green! Variegations on a Theme" — Al Wojcik, Allen Park, Michigan. Having spent the last 15 years hybridizing miniature sinningias, Al has more recently been studying and collecting variegated plants of all kinds. He has discovered and named several one-of-a-kind variegated "sports" of popular indoor and outdoor plants. His program will discuss the causes of variegation and the challenges of growing variegated plants. A slide show will feature his unique collection of plant mutations and will take you along on a "sport fishing" expedition to several commercial greenhouses.

Gesneriad Register

Judy Becker, Registrar
432 Undermountain Rd., Salisbury, CT 06068

The following Registrations should be added to the Registered Gesneriads List Found in Appendix C of the 1990 Gesneriad Register:

Sinningia 'Rosemary'	IR97510	Raymond Coyle
Chirita 'Moon Walker'	IR97511	Masaki Yamagata
Chirita 'Hotei'	IR97516	Frances N. Batcheller
×*Brigandra* 'Lily Wilson'	IR98517	Maureen and Brian Wilson
×*Brigandra* 'Glen Affric'	IR98518	Maureen and Brian Wilson

The descriptions are as follows:

***Sinningia* 'Rosemary'**, 1997, IR97510, Raymond Coyle, New York, (*S. leopoldii* × *S. eumorpha* white). Cross made 6/95, planted 10/95, first bloomed 4/96. Plant compact, leaves opposite, in basal rosette, proceding rows perpendicular, heart-shaped, erect. New growth arises from tuber after flowering with no dormancy period. Leaves dark green, red veins below, 160 mm long, 120 mm wide with 15 mm petiole. Split green calyx, 5 mm long, pedicel 7 mm long with 2-3 flowers per leaf axil. Corolla outer tube rose-mauve, face lavender, throat white with 7 purple lines fading to dots inside, salverform, 40 mm long, 20-22 mm wide. Plant distributed to AGGS Greater New York Chapter and AVS of Greater New York.

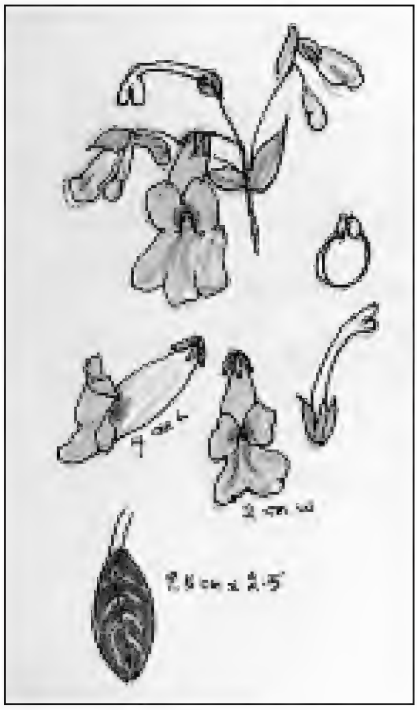
***Chirita* 'Moon Walker'**, 1997, IR97511, Masaki Yamagata, Japan, (*C. moonii* × *C. walkerae*). Cross made 5/25/95, seed planted 9/4/95, first flowered 9/27/96. Erect habit, reaching 50 cm. Leaves light green (137C) with silver hairs, elliptic, 15 cm long, 6 cm wide with 4 cm petiole, tip acuminate, base cuneate, entire margin. Calyx green-yellow, 2.8 cm. long, pedicel 7 cm long with 1 flower per axil. Tube white outside with purple limb (82A), throat white with yellow (14B), salverform, 7 cm long, 5 cm wide. Free flowering.

***Chirita* 'Hotei'**, 1997, IR97516, Frances N. Batcheller, New Hampshire, (*C. linearifolia* × *C. eburnea* [yellow form]). Cross made and planted in 1996, first bloomed 1997. Plant habit and leaf is *linearifolia,* a basal rosette, with 15 cm long flower scapes. Flowers resemble *eburnea* in size and color but lack the large white bracts. Leaves medium green (RHS 137A), 9.5 cm long, 2.5 cm. wide, linear with acute tip and entire margin. Split calyx is pale yellow green, 1 cm long; pedicel 1.3 cm long with 6 flowers per leaf axil. Flowers infunduliform, primrose yellow (RHS 4B), 4 cm long and 2 cm in diameter.

×***Brigandra* 'Lily Wilson'**, 1998, IR98517, Maureen and Brian Wilson, Scotland, UK, (*Briggsia aurantiaca* × *Opithandra primuloides*). Cross made May, 1994, planted September, 1994, and first flowered May, 1996. Plant is only vegetatively reproducible. A seedling selection from ×*Brigandra callilantha,* it is vigorous, forming a 19 cm diameter rosette by its second year. Having shorter peduncles, it is a neater plant. Hairy leaves are mid green, 7 cm long, 5 cm wide with 3 cm petiole, ovate, with acute tip and cuneate base. Serrate margin is also wavy, not characteristic of the other seedlings.

Sinningia 'Rosemary'

Chirita 'Moon Walker'



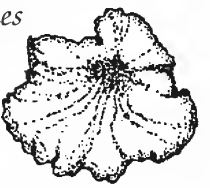
Chirita 'Hotei'

Green calyx, split, 0.5 cm long, peduncle 5-7 cm long, pedicel 2-3 cm with 2-8 flowers per pedicel. Corolla tube somewhat funnelform, but sides are almost parallel to calyx, petals spreading, 2.7 cm long, 1 cm in diameter. Corolla ivory, suffused plum on tube, and ivory streaked deeper plum on petals and in throat.

×***Brigandra*** **'Glen Affric'**, 1998, IR98518, Maureen and Brian Wilson, Scotland, UK, (*Briggsia muscicola* × *Opithandra primuloides*). Cross made May, 1994, planted September, 1994, and first flowered August, 1995, and May, 1996. Plant is sterile, and only reproducible vegetatively. Plant grows vigorously, forming a rosette approximately 24 cm in diameter in second year. Hairy leaves are apple green, 7-10 cm long, 5-6 cm wide with 4 cm petiole, elliptic with acute tip and cuneate base, margin serrate. Green calyx, split, 7 mm long, peduncle 10-12 cm long, pedicel 3-4 cm long, with 1-5 flowers per pedicel. Corolla salverform but with more parallel sides and slight swelling at base of tube, approximately 3 cm long, 1 cm in diameter. Corolla tube cream, with ivory beneath, paler above with mauve-lilac striping. Petals splashed above with mauve-lilac, becoming heavily mottled in throat, retaining hint of parallel lines.

×*Brigandra* 'Glen Affric'

×*Brigandra* 'Lily Wilson'



Rhytidophyllum leucomallon

Marlene Beam
1736 S. Oakland St., Aurora, CO 80012

Rhytidophyllum is a genus found growing along the roadsides in the West Indies. As a wild gesneriad, it grows into a three-foot shrub with enough pollen to dust the thoroughfares of Haiti. *R. leucomallon, R.villosulum* and *R. tomentosum* are several species in cultivation. *R. leucomallon,* the most attractive and colorful of this genus, is the primary species I will discuss in this article.

Dr. Miriam Denham, my botanical advisor, told me "rhytido" means wrinkled or puckered, "leuco" means white, and "mallon" means wool. *Rhytidophyllum*, a fibrous-rooted genus, consumes much water and bathes in the sunlight exposed to favoring winds. Generally it does not receive enough light to bloom as a houseplant. Lime in the soil is essential. Furthermore, the Haitians consider it a WEED!

A few years ago, several seedlings of *Rhytidophyllum leucomallon* came to dwell with this novice in lesser-known gesneriads. As this multi-colored plant grew and matured, knowledge about its color and natural habits were shed. A few distinctive characteristics are suggested in its botanical name: stiff and puckered green leaves are covered by woolly white hairs which lessen the amount of water lost in the process of transpiration. Unexpectedly, the delicate overlay of rosy-pink hairs on the new growth blend and enhance the harsher appearing foliage. The pink pigment may create a slight elevation in the leaf temperature. Nature is calculating.

Rhytidophyllum leucomallon
Grown by Marlene Beam; photo by Ruben Jimenez

Surprisingly, *Rhytidophyllum leucomallon* flourished in a cool basement long after its plastic protection was removed. It lived in harmony with cool lovers of the Old World and resided on the same shelves with *Streptocarpus, Petrocosmea* and *Primulina.* Although the temperature is maintained at 65-70°F, humidity varies from 35 to 75 per cent. Ceiling fans supply the windy conditions while wicking on consistently damp mats pacifies the water needs. Initially, two cool-white tubes provided its sole light source.

With increasing growth, efforts to stake the plant in an upright position were wasted. While staking culminated in a mishap, learning grew. Firstly, this is not an upright plant—it lazily reclines in nature. Secondly, broken woody stems or leaves are not very restorative.

Although one seedling survived and grew, its chances of vitality and bloom faded after multiple journeys in 1996 (to judging school in June, to the New York Convention in July, and to a local show that fall). Although each trip shed growing information about it, *Rhytidophyllum leucomallon* suddenly appeared shocked by its travels. The once woolly and roseate color browned, foliage dropped and a bare stem became longer and longer. During this shedding process, however, the growth of tiny leaves at the nodes awakened enough interest to continue growing this ugly, bare-stemmed plant in precious space next to show hopefuls. But, a lesser-known entertains with puzzling and glad surprises.

Rhytidophyllum leucomallon doubled in size and grew virgin foliage by early spring of 1997. It was repotted in the usual light-weight soil with a handful of eggshells (the bag of lime was misplaced). Propping the stems on foam plates or meat trays prevented it from laying and rotting on the wet mats.

As the potential for blooming joyously unfolded in March of 1997, light was increased. The plant was centered under one new cool-white tube and one wide-spectrum tube for twelve hours per day. Fertilizer was increased (Peters 5-50-17 at a rate of 1/4 teaspoon per gallon). By May, multiple clusters of axillary buds reached for the light tubes, and very tiny blooms gradually opened. These pink blooms are really minute for such a sizable plant and inconspicuously blend with the extended axillae. With the slightest tap, pollen scatters and sticks to the foliage like mealybugs. The cleaning of any rough-textured, puckered plant in this genus is a bleak task.

The blossoms subsequently unfold one at a time and prosper about three days each. As the plant matures, more blooms open but rarely simultaneously. Although blooming continues into fall, the foliage loses vitality and begins its annual shedding process in June. Long internodes develop when this regeneration begins.

The species *Rhytidophyllum villosulum* (meaning soft hairs) was purchased as interest in this genus grew. The beautiful yellow-green foliage of this species which I also exhibited at the Denver Convention Flower Show has shed and the stem has grown longer. At the time of this writing in December of 1997, yellow-green axillary blooms blend with the few remaining leaves at the very top of an elongated stem. While it is a show-and-tell plant in this cocndition, it would definitely shed many points at a show. My plant of *R. tomentosum* "died" before I learned that *Rhytidophyllum* is a deciduous genus.

A hunger for perpetual beauty can mar remarkable and latent potentiality. The beauty of growing lesser-known gesneriads is the knowledge they shed.

Rhytidophyllum leucomallon exhibited by Marlene Beam
at the 1997 Convention Flower Show; photo by Gerard Vriens

American Gloxinia & Gesneriad Society, Inc.

Financial Statement — January 1, 1997 to December 31, 1997

GENERAL FUND		
Beginning Balance: January 1, 1997		$29,111.26
Receipts:		
Membership – Renewals 1 year	$9,798.00	
Membership – Renewals 3 year	4,873.00	
Membership – New 1 year	4,216.75	
Membership – New 3 year	625.00	
Membership – Sustaining	125.00	
Membership Postage	460.00	
Promotions	2,165.00	
Advertising in THE GLOXINIAN	1,051.60	
Sale of Literature and Supplies	1,417.75	
Library and Slide Programs	578.00	
Sale of Seed	6,460.91	
Donations		
Fund for Progress	1,195.25	
Color Photo Sponsorships	1,282.25	
Judging Publication and Income	1,528.00	
Other Income		
Income from Endowment Fund	1,180.57	
Bank Interest, Savings & CD	1,522.00	
Insurance	830.00	
Total Receipts		39,309.08
Total On Hand Plus Receipts		$68,420.34
Disbursements:		
Publication of THE GLOXINIAN	(23,908.02)	
Other Publications	(523.95)	
Membership Processing	(1,329.85)	
Operating Expenses	(4,073.99)	
Investments		
Certificate of Deposit (CD), see below	(15,000.00)	
Miscellaneous	(2,056.00)	
Total Disbursements		(46,891.81)
Balance on Hand		$21,528.53
General Fund Other Items:		
CD, Current Value	14,850.00	
Savings Account (interest included above)	10,000.00	
Total Other Items		24,850.00
Total on Hand, December 31, 1997		**$46,378.53**
ELVIN McDONALD RESEARCH FUND:		
Balance: January 1, 1997		$1,632.23
Interest		65.41
Donations		255.00
Plant Sale Proceeds		531.12
Balance on Hand: December 31, 1997		**$2,483.76**
INTERNATIONAL GESNERIAD REGISTER FUND:		
Balance: January 1, 1997		$9,648.05
Sale of Registers, Plant Registrations		274.90
Interest on Savings		123.54
Balance in Savings	$4,709.91	
Interest on CD		324.83
Balance of CD	5,661.41	
Combined Balance Savings and Certificate		**$10,371.32**

FRANCES BATCHELLER ENDOWMENT FUND:		
Balance Combined: January 1, 1997, Adjusted ($1,886.23 increase in 1996 value confirmed)		$81,819.32
Change in Value, Mutual Fund, as of 12/31/97		6,529.64
Life Memberships	1,200.00	
Donations	706.03	
Convention Auction	3,040.00	
Internet Auction	283.00	
Interest Earned		5,229.03
CD	878.74	
Savings	176.81	
		1,055.55
Miscellaneous Income		618.27
Balances, December 31, 1997:		
Savings	8,292.98	
CD #1	22,602.15	
CD #2	3,512.89	
Fidelity Asset Manager	35,843.79	
Safeco Mutual Fund	25,000.00	
Combined Balances		**$95,251.81**

Proposed AGGS Bylaws Amendments

The Board of Directors has proposed the following amendments to the AGGS Bylaws which will be brought before the membership at the Annual Meeting on Friday, July 3, 1998 in Chicago, Illinois:

ARTICLE VI

Section 3 VACANCIES IN OFFICE

Any vacancy in the elected officers or the Board of Directors caused by death, disability, non-fulfillment of duty or resignation shall be filled by the President, with the approval of the Board of Directors.

ARTICLE III

Section 5 STANDING COMMITTEES

There shall be the following Standing Committees: Publications, Research Fund, Convention, Finance, Nominating, Internet Communications, and such other committees as may be required in the operation of the Society. Committee Chairmen other than the Chairman of the Nominating Committee shall be appointed by the President, following the approval of the Board of Directors.

ARTICLE IV

Section 14 INTERNET COMMUNICATIONS COMMITTEE

The Internet Communications Committee shall coordinate the creation and maintenance of a presence on the Internet pertaining to AGGS.

The amendment to Article VI is to clarify the procedure to be followed in the event of a vacancy in the elected officers. The procedure will be the same as is presently used to fill a vacancy in the Board of Directors. The amendments to Article III and Article IV are to establish an Internet Communications Committee as one of the standing committees specified in the Bylaws.

Clay Anderson, Bylaws Chair

American Gloxinia and Gesneriad Society, Inc.

4nd Annual Convention, 1998
July 1 to July 4, Chicago, Illinois

Call for 1998 Annual Membership Meeting

The Annual Meeting of the members of the American Gloxinia and Gesneriad Society will be held on Friday, July 3, at 12:00 noon for the purpose of transacting business which may properly come before the meeting.

Call for 1998 Board of Directors Meetings

The Board of Directors meeting will be held on Tuesday, June 30, at 1:00 P.M., for the purpose of transacting business which may properly come before the meeting. A special Board meeting will be held on Friday, July 3, at 3:45 P.M. A meeting of the new Board will be held on Sunday, July 5 at 9:00 A.M.

Peter Shalit
Recording Secretary

Nominating Committee Report

The following members have agreed to have their names put in nomination as directors for a three-year term ending in 2001:

Carol Ann Bonner	Tennessee
Doris Brownlie	Canada
Doris Carson	Missouri
Jon Dixon	California
Helen Freidberg	Massachusetts
Ben Paternoster	New York
Peter Shalit	Washington

AGGS Nominating Committee
Doris Carson, Chair
M. J. Tyler
Bob Connelly

Chirita lavandulacea
seeds (much enlarged)

Line drawings throughout from Harold E. Moore's 1957 book *African Violets, Gloxinias, and their relatives.*

AGGS plant labels are available once again. These four inch plastic labels are imprinted with the text:

FOR GROWING INFO & AGGS
MEMBERSHIP: P.O. BOX 1598L
PORT ANGELES, WA 98362-0194
http://www.aggs.org

The other side is blank for identifying your gesneriads. Perfect for labeling sales table plants and spreading the word! For each package of 250 labels, send $4.50, check, money order, Visa or MasterCard, to: Carol Ann Bonner, 3705 Tibbs Drive, Nashville, TN 37211-3413.

Application for Membership — *American Gloxinia and Gesneriad Society*

WELCOME – membership in our international society includes quarterly issues of THE GLOXINIAN – *The Journal for Gesneriad Growers,* a copy of *How to Know and Grow Gesneriads*, a packet of gesneriad seeds and a wealth of information about our AGGS Chapters, Flower Shows, Publications, Research, Slide Programs and Seed Fund. Membership begins upon receipt of dues.

☐ **New Member** Date _____

☐ **Renewal** AGGS Membership # _____

Name _____
FAMILY NAME GIVEN NAME MIDDLE INITIAL

Address _____
STREET

_____
CITY STATE ZIP CODE COUNTRY

Email _____ Telephone _____

(Rates in US$)	Mailing in US 1 year	Mailing in US 3 years	Mailing outside US 1yr.	Mailing outside US 3 yrs.
☐ **Individual**	$20	$55	$25	$70
☐ **Family**	$21	$58	$26	$73
☐ **Sustaining** (minimum)	$30	$90	$35	$105
☐ **Research** (minimum)	$40	$120	$45	$135
☐ **Life**	Mailing in US $300		Outside US $375	

I wish to make an additional contribution as follows:
☐ Frances Batcheller Endowment Fund
☐ Elvin McDonald Research Fund
☐ Color Fund for THE GLOXINIAN
☐ In Honor or ☐ Memory of:
_____

THE GLOXINIAN is mailed first-class to members outside the US and bulk-rate within the US.

Mail to: **AGGS Membership Secretariat, MJ & DB Tyler, PO Box 1598, Port Angeles, WA 98362-0194 USA**

Please make checks or money orders payable, in US$ on a US bank to: **AGGS**

Or, charge my ☐ **VISA**, or ☐ **MasterCard** the total amount of $_____

Card# _____ Exp Date _____ Signature _____

AGGS Publications

Achimenes Register (1996) $6.00
Episcia Register (1993) $5.00
Aeschynanthus Register (1990) .$3.50
Sinningia Register (1988) $5.50
Columnea Register (1987).....$4.50
Intergeneric Hybrids Register: Tribe Gloxinaieae (1986) $3.00
Kohleria Register (1985) $2.50
Streptocarpus Register (1979)...$3.50
Nematanthus Register (1978) $1.50

Flower Show Manual (1996) for Judges & Exhibitors.....$6.00
Flower Show Entry Cards per 100 .....$7.00
Propagation of Gesneriads and Birds & Bees & Gesneriad Seeds $2.00
THE GLOXINIAN Picture Index (1966–1990).....$4.00
THE GLOXINIAN Current Issues $5.00

Back Issues — Years 1996, 97	$20.00 set of 4
Back Issues — Years 1993, 94, 95	$20.00 set of 6
Back Issues — Years 1989, 90, 91, 92	$15.00 set of 6
Back Issues — Years 1985, 86, 87, 88	$12.00 set of 6
Back Issues — 1960–1984 (as available)	$10.00 set of 10

Foreign orders please include 20% additional for postage.

Make checks payable (in U.S. Funds) to: AGGS, Inc.

To pay by credit card, specify Visa or MasterCard, include the credit card number, expiration date, and your signature with the order.

Mail to:

Pat Richards
AGGS Publications
15105 S. Seminole Dr.
Olathe, KS 66062-3004

the GLOXINIAN
PO Box 1598
Port Angeles WA 98362-0194

Return Service Requested

American Gloxinia and Gesneriad Society
MEMBERSHIP CARD

NONPROFIT ORG.
U.S. POSTAGE
PAID
PERMIT NO. 252
PROV. RI